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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/602,835	06/24/2003	Yun-Ting Lin	AE 030212	9319
23662	7590	09/23/2004	EXAMINER	
ROBERT M. MCDERMOTT, ESQ. 1824 FEDERAL FARM ROAD MONTROSS, VA 22520			GOINS, DAVETTA WOODS	
			ART UNIT	PAPER NUMBER
			2632	

DATE MAILED: 09/23/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/602,835

Applicant(s)

LIN, YUN-TING

Examiner

Davetta W. Goins

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-28 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-17, 19-21 and 23-28 is/are rejected.
- 7) ☒ Claim(s) 22 and 28 is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. ____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. ____. |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date <u>6/24/03</u> . | 6) <input type="checkbox"/> Other: ____. |

DETAILED ACTION

Claim Rejections - 35 USC § 112

1. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

2. Claims 6, 7, 17 are rejected under 35 U.S.C. 112, first paragraph, as based on a disclosure which is not enabling. The claimed “trajectory parameters” and claimed “latency parameter that corresponds to a delay associated with processing the information” is critical or essential to the practice of the invention, but not included in the claim(s) is not enabled by the disclosure. See *In re Mayhew*, 527 F.2d 1229, 188 USPQ 356 (CCPA 1976).

Allowable Subject Matter

3. Claims 18 and 22 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Claim Rejections - 35 USC § 103

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

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5. Claims 1-5, 8-16, 19-21, and 23-28 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kawashima et al. (US Pat. 6,079,862) in view of Lazo et al. (US Pat. 6,791,603 B2)

In reference to claims 1, 3, Kawashima discloses a) the claimed video surveillance system that identifies a visual object based on image information provided by one or more cameras, which is met by image recognition unit 106A into which video signal is input from 1st infrared camera 103A and 1st color camera 104A (col. 42-59), b) the claimed surveillance system that identifies an object based on reception information provided by a plurality of receivers, which is met by the cameras 103A and camera 104A detect a marker, located on an object, the marker outputting position of the object via infrared light (col. 25, lines 56-67; col. 34, lines 42-67), and c) the claimed object linker, operably coupled to the video surveillance system that is configured to link the visual-object to the signals from the object, which is met by image recognition unit 106A and image processing technique used from the infrared camera, detecting the marker on an object, and image recognize units 106A, 106B for recognizing the marker (col. 34, lines 21-59). Although Kawashima does not disclose the claimed RF surveillance system to identify an RF-object, he does disclose a marker, located on an object, that emits infrared that can be detected by the tracking apparatus (col. 42-59). Lazo discloses a surveillance system including a couple of tracking video cameras 24 and 26 used to monitor objects or persons upon entry into a specific surveillance zone; an RFID tag 20 is used along with RFID reader 22 to help track the person(s) within either surveillance zone1 or zone 2 (col. 3, lines 17-67). Since both Kawashima and Lazo disclose tracking systems using cameras to follow an object or person with a device located on

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the object to help locate the object's location, it would have been obvious to one of ordinary skill in the art at the time of the invention incorporate the teaching of using an RF surveillance system with an RF-object, as disclosed by Lazo, with the system of Kawashima, as a different method of being able to detect specific location of a person as well as known identification about the person such that specific information can be used to help recognize the person being monitored by the cameras.

In reference to claims 2, 4, 5-10, neither Kawashima nor Lazo specifically disclose the claimed video surveillance system configured to determine a first location coordinate corresponding to the visual object, and the RF surveillance system configured to determine a second location corresponding to the RF-object, and a calibration module. However, Kawashima discloses that proposed markers by the existing image processing techniques from a video signal from the infrared camera 103A and detect coordinates, "and" it can recognize the proposed objects to be tracked by the existing image processing techniques from a video signal from the color camera 104A and detect the coordinates (col. 34, lines 42-59). Lazo discloses a surveillance system including a couple of tracking video cameras 24 and 26 used to monitor objects or persons upon entry into a specific surveillance zone; an RFID tag 20 is used along with RFID reader 22 to help track the person(s) within either surveillance zone1 or zone 2 (col. 3, lines 17-67). Since both Kawashima and Lazo disclose tracking systems using cameras to follow an object or person with a device located on the object to help locate the object's location, it would have been obvious to one of ordinary skill in the art at the time of the invention incorporate the teaching of using an RF surveillance system with an RF-object, as disclosed by Lazo, with the system of Kawashima,

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and used both the RF-object detection as well as the video surveillance to determine the location of the monitored object or person to ensure that the object's position coordinate is precise.

In reference to claims 11-13, 15-16, 19, 21, 25, 27, 28, Kawashima discloses a) the method of attaching a tag to a visually identifiable object, which is met by an infrared marker placed on an object to be monitored by the tracking apparatus (col. 25, lines 56-67; col. 26, lines 1-14), b) the claimed method of determining a first location coordinate of the object based on an appearance of the object in a scene by a video camera and determining a second location coordinate of the object based on reception from a plurality of receivers, which is met by proposed markers by the existing image processing techniques from a video signal from the infrared camera 103A and detect coordinates, "and" it can recognize the proposed objects to be tracked by the existing image processing techniques from a video signal from the color camera 104A and detect the coordinates (col. 34, lines 42-59), c) the claimed method of determining one or more adjustment parameters that facilitates a reduction in a difference between the first and second location coordinates of the object, which is met by a three-dimensional coordinate calculation unit 107 selecting a position coordinate of the highest conforming in position as a selected point among the position coordinate of proposed points detected by 1st and 2nd image recognition units 106A and 106B (col. 34, lines 42-67). Although Kawashima does not disclose the claimed attaching an RFID tag to an object and obtaining reception information from the RFID tag, he does disclose a marker, located on an object, that emits infrared that can be detected by the tracking apparatus (col. 42-59). Lazo discloses a surveillance system including a couple of tracking video cameras 24 and 26 used to monitor objects or persons upon entry into a specific surveillance

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zone; an RFID tag 20 is used along with RFID reader 22 to help track the person(s) within either surveillance zone 1 or zone 2 (col. 3, lines 17-67). Since both Kawashima and Lazo disclose tracking systems using cameras to follow an object or person with a device located on the object to help locate the object's location, it would have been obvious to one of ordinary skill in the art at the time of the invention incorporate the teaching of using an RF surveillance system with an RF-object, as disclosed by Lazo, with the system of Kawashima, as a different method of being able to detect specific location of a person as well as known identification about the person such that specific information can be used to help recognize the person being monitored by the cameras.

In reference to claims 14, 20, Kawashima discloses the claimed method wherein the reception information includes a time-of-arrival parameter by each of the plurality of receivers and at least one of the one or more adjustment parameters is configured to be applied to the time-of-arrival parameter of at least one of the plurality of receivers, which is met by the camera 53 picks up images at regular time intervals (time-of-arrival parameter) such that the image is displayed by the pickup image displaying section (col. 21, lines 31-48).

In reference to claims 23, 26, although Kawashima does not specifically disclose the claimed method of at least one of the parameters is dependent upon a speed of motion of the RF transmitter, he does disclose that the object being tracked, with the ir marker, can be tracked at high speed (col. 40, lines 58-67). Lazo discloses a surveillance system including a couple of tracking video cameras 24 and 26 used to monitor objects or persons upon entry into a specific

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surveillance zone; an RFID tag 20 is used along with RFID reader 22 to help track the person(s) within either surveillance zone1 or zone 2 (col. 3, lines 17-67). Lazo also discloses that the tracking features include image speed, direction, acceleration, and other relevant parameters (col. 4, lines 12-29). Since both Kawashima and Lazo disclose tracking systems using cameras to follow an object or person with a device located on the object to help locate the object's location, it would have been obvious to one of ordinary skill in the art at the time of the invention incorporate the teaching of using the parameter of speed and motion, as disclosed by Lazo, with the system of Kawashima, to ensure that the system is capable of accurately tracking any object or person even while moving at various speeds.

6. The prior art of record and not relied upon is considered pertinent to the applicant's disclosure as follows. Jenkins (US Pat. 5,801,618), Wadell et al. (US Pat. 6,204,813 B1), Lanzi et al. (US Pat. 6,353,406 B1), Curwen et al. (US Pat. 6,567,005 B2), and Barbour et al. (US Pat. 6,671,390 B1), which are references that include tracking devices for objects or persons.

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Davetta W. Goins whose telephone number is 571-272-2957. The examiner can normally be reached on Mon-Fri with every other Fri. off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Daniel Wu can be reached on 571-272-2964. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

DAVETTA W. GOINS
PRIMARY EXAMINER



D.W.G.

September 16, 2004

Davetta W. Goins
Primary Examiner
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